

Kinetics of Oxidation ...

S/186/61/003/003/013/018
E071/E435

dependence of the proportion of uranium oxidized by the fast acting part of the oxidants on its concentration was determined experimentally and also calculated by means of

$$\% U_f = 100 \frac{[U_f]}{U_o} = 100 \frac{C_o}{U_o} (0.5 + 0.07 [H^+])$$

% U_f characterizes the relative participation of the fast acting parts of the oxidizer and not the part U_o which is oxidized with ClO_2 ; only in the case of excess quantities of the oxidizer will these values be identical. The agreement between the calculated and experimental values confirmed the correctness of the views expressed on the oxidation of uranium by hypochlorite. There are 3 figures, 3 tables and 15 references: 9 Soviet-bloc and 6 non-Soviet-bloc. The reference to the English language publication reads as follows: J.F.White, M.C.Taylor, G.P.Vincent, Ind.Eng.Chem., 34, 7, 782 (1942).

SUBMITTED: May 24, 1960

Card 3/3

21.33.00

89354
S/089/61/010/002/004/018
B102/B209

AUTHORS:

Kanevskiy, Ye. A., Pchelkin, V. A.

TITLE:

On the interaction between solid UO_2 and MnO_2 in sulfuric acid solution

PERIODICAL:

Atomnaya energiya, v. 10, no. 2, 1961, 138-142

TEXT: The widely spread use of pyrolusite in the extraction of uranium from ores by means of sulfuric acid, wherein pyrolusite undoubtedly plays the role of an oxidizer, makes it necessary to investigate carefully the mechanisms of $UO_2 - MnO_2$ reactions and the effects thereon as exerted by degree of mixture, component ratio, H_2SO_4 concentration, pre-extraction of oxides, etc. So far, these problems have been studied only generally in the frame of uranium extraction processes; the present paper devotes to them a special treatise. The mentioned reaction mechanism is usually written as $UO_2 + MnO_2 + 2H_2SO_4 \rightarrow UO_2SO_4 + MnSO_4 + 2H_2O$ or as $UO_2 + MnO_2 + 4H^+ \rightarrow UO_2^{2+} + Mn^{2+} + 2H_2O$. Experimental checking of this equation showed that the molar

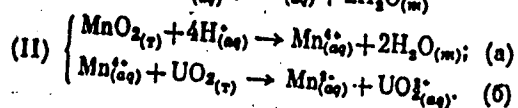
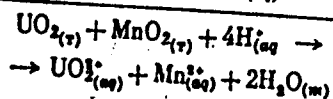
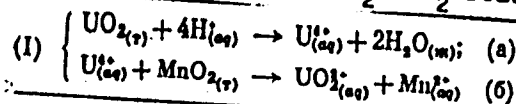
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On the interaction ...

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ratio of the two components was equal to unity. This equation was taken as basis of the further investigations. It may be assumed that first, one of the oxides is dissolved in the acid medium and that then a heterogeneous redox-process takes place. In this case, the UO_2 - MnO_2 reaction is described by I or II.



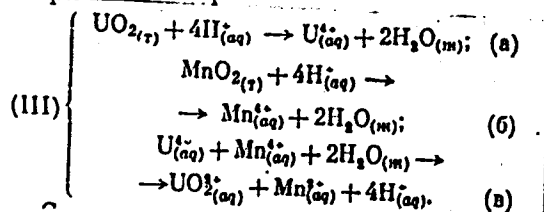
However, it may also be assumed that UO_2 is dissolved first, and then MnO_2 , and that then the hexa- and tetravalent uranium ions homogeneously enter the reaction:

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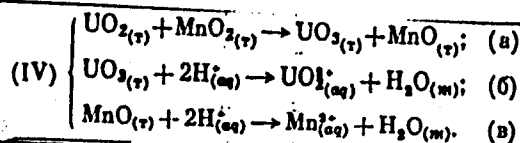
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B102/B209

On the interaction ...



The dependence of the reaction rate in the case of constant UO_2 content on the MnO_2 excess was examined and compared with the stoichiometric ratio. The same was made for UO_2 excess. "y"(ch)-type MnO_2 and "xy"(kh.ch.)-type H_2SO_4 were used in the investigations; [Abstracter's note: "ch" means "pure", and "kh.ch." "chemically pure"].. The results show a solid-state reaction



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is another possible reaction. [Abstracter's note: The subscript (T) indicates the solid, the subscript (X) the liquid phase]. Also some other facts speak in favor of the latter possibility so that the process IV appears to be the most probable one; however, the others must not be excluded. Moreover, the effect of the surface condition of the reacting components upon the reaction mechanism was studied. UO_2 and MnO_2 were powdered, put into reaction in 0.5 N H_2SO_4 at 20°C (4 hrs.), and the degree of reaction was determined on various conditions. Grinding of the two oxides, in particular simultaneously, showed to stimulate the reaction considerably (unground: 12%, separately ground: 45%, simultaneously ground: 83%) which again speaks for IV. However, radiographic examinations showed that UO_2 and MnO_2 in the form of a dry powder mixture practically do not react (20.1%). An investigation as to whether the solid-to-liquid ratio affects the degree of reaction gave a negative result (the degree of reaction remained practically unchanged from 1:1 to 1:20). Thus, all experimental data favor IV upon which process, above all, steric factors exert an influence. Finally, the effect of iron ions was examined with the

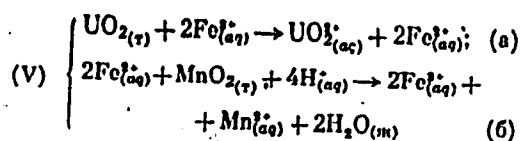
Card 4/5

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On the interaction ...

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B102/B209

result that the reaction scheme



holds. Since uranium minerals extracted from ores are practically always containing iron, the scheme V may be employed to represent the reaction. In conclusion, the authors thank V. G. Romanova and L. V. Zverev for their co-operation and discussions. There are 1 figure and 16 references: 10 Soviet-bloc and 2 non-Soviet-bloc.

SUBMITTED: July 5, 1960

Card 5/5

21415

S/089/61/011/006/C13/014
B101/B102

21.4300

AUTHORS:

Kanevskiy, Ye. A., Pchelkin, V. A.

TITLE:

Activation energy of uranium dioxide dissolution in a sulfuric-acid medium in the presence of manganese dioxide

PERIODICAL:

Atomnaya energiya, v. 11, no. 6, 1961, 549-550

TEXT: Starting from the widespread use of pyrolusite in leaching uranium from ores by sulfuric acid, the authors studied the activation energy of the process $UO_2 + MnO_2 + 2H_2SO_4 \rightarrow UO_2SO_4 + MnSO_4 + 2H_2O$. The influence of temperature was investigated between 20 and 80°C. UO_2 obtained by reduction of U_3O_8 by hydrogen at 900°C was used. It contained 98% of U(IV) related to U(IV) + U(VI). Particle size of initial oxides did not exceed 0.074 mm. Temperature, ratio $UO_2 : MnO_2$, and time of test were altered. It was found that the amount of dissolved UO_2 at 20°C increased linearly with time if there was an MnO_2 excess (after 2 hr approximately 8% with $MnO_2 : UO_2 = 5 : 1$; approximately 14% at a ratio of 25 : 1; about

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X

21,15

S/089/61/011/006/013/014
B101/B102

Activation energy of uranium ...

30% at a ratio of 125 : 1). Dissolution of UO_2 in the absence of MnO_2 was taken into account by check tests. The rate of UO_2 dissolution in the presence of MnO_2 as an oxidizer follows the equation of Arrhenius (linear dependence of the logarithm of rate on $1/T$). An activation energy of 6 kcal/mole was ascertained from this equation. It is pointed out that steric factors impeding the reaction play a role in the investigated reaction of two solid phases with a solution. There are 2 figures and 3 references: 2 Soviet and 1 non-Soviet. The reference to the English-language publication reads as follows: T. Mac-Kay, M. Wadsworth, Trans. AIME, 212, 597 (1958).

SUBMITTED: November 9, 1960

Card 2/2

X

FEDOROVA, L.A.; KANEVSKIY, Ye.A.

Effect of the medium on the oxidation of uranium (IV)
by chlorate. Radiokhimiya 4 no.4:502-504 '62. (MIRA 15:11)
(Uranium) (Oxidation) (Chlorates)

KANEVSKIY, Ye.A.; FILIPPOV, A.P.; TIMOFEYEVA, N.V.;
Prinimal uchastnik VEL'MATKIN, M.I.

Composition of gases produced in the interaction between
uranium dioxide and nitric acid. Atom. energ. 13 no.5:484-486
N '62. (MIRA 15:11)
(Nuclear reactions) (Uranium dioxide)
(Nitric acid)

SPITSYN, Vikt.I.; KANEVSKIY, Ye.A.; NESMEYANOVA, G.M.

Reply to the letter by O.A.Songina, Z.B.Rozhdestvenskaia on the article by
Vikt.Spitsyn, G.M.Nesmeyanova, E.A.Kanevskii. Zhur.neorg.khim. no.3:782
M- '63. (MIRA 164)
(Uranium oxides) (Solution (Chemistry)) (Songina, O.A.)
(Rozhdestvenskaia, Z.B.)

KANEVSKIY, Ye. A.; YAKUBOVICH, I. A.; et al

"Kinetics of the Homogeneous and Heterogeneous Oxidation of Uranium (IV)
and its Acid Leaching Processes."

report submitted for 2nd Intl Conf, Peaceful Uses of Atomic Energy, Geneva,
31 Aug-9 Sep 64.

KANEVSKIY, Ye.A.; PAVLOVSKAYA, G.R.

Microcoulometric investigation of the reduction of uranyl carbonate complexes. Zhur.neorg.khim. 9 no.4:827-830 Ap '64.

(MIRA 17:4)

FILIPPOV, A.P.; KANEVSKIY, Ye.A.

Oxidation-reduction potential and the degree of uranium
leaching in sulfuric acid solutions. Atom. energ. 17
no.3:205-208 S '64. (MIRA 17:9)

APPROVED FOR RELEASE: 06/13/2000
ACCESSION NR: AP5001644

3/0186/44/006/006/0712/022

U.S. DEPT. OF THE INTERIOR

Geological Survey

Journal of Research, v. 6, no. 6, 1964, 73-77

Uranium dioxide, uranyl nitrate

An attempt was made to examine the principal factors determining the oxidizing activity of nitric acid in sulfuric acid solutions. The effect of temperature, concentration of nitric acid, and of the ratio of the two acids was studied. It was found that the rate of oxidation of uranium dioxide and to offer an explanation of the results. The results indicate that temperature is a decisive factor in determining the rate of oxidation and its effect was studied.

...factor in ... the oxidative properties of
reaction mixture. It was studied together with the rate of stirring of the
of nitric acid are strong oxidants. The authors also studied the kinetics of
establishment of oxidation-reduction potentials in the system UO_2 - HNO_3 - H_2SO_4 -
 H_2O and the kinetics of the simultaneous dissolution of UO_2 . No direct relation

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ACCESSION NR: AP5001644

was found to exist between these two phenomena, but the authors conclude that the dissolution of UO_2 is probably related to an acceleration of the decomposition of HNO_3 under the catalytic influence of the products of reduction of this acid. The experimental part of the work was done in collaboration with I. O. Petrov. It was: 4 figures and 2 tables.

ASSOCIATION: none

SUBMITTED: 04Dec63

ENCL: 00

SUB CODE: IC

NO REF SOV: 003

OTHER: 006

Card 2/2

KANEVSKIY, Ye.A.; FILIPPOV, A.F.

Kinetics of the reaction of UO_3 and $Fe(III)$ in perchloric acid solutions. Radiokhimiia 7 no.2:207-214 '65.

(MIRA 18:6)

KANEVICH, Y.A.; GONCHAROV, I.V.; RENGEVICH, V.B.

Kinetics of oxidation of U(IV) by atmospheric oxygen in carbonate solutions. Radiokhimiya 7 no.5:579-585 '65.

Catalytic action of copper ammoniate during oxidation of uranium dioxide by atmospheric oxygen. Ibid.:585-589

(MIRA 18:10)

FILIPPOV, A.P.; KANEVSKIY, Ye.A.; TIMOFEYEVA, N.V.

Reaction of uranium dioxide with nitrous acid in a sulfuric acid solution. Zhur.prikl.khim. 38 no.3:658-660 Mr '65.
(MIRA 18:11)

1. Submitted May 24, 1964.

CHERKASSKAYA, Ye.I.; ALEKSANDROV, O.A.; KANEVSKIY, Ye.I.

Brief news. Sov. zdav. 13 no.4:61-63 J1-Ag '54. (MIRA 7:9)
(STATISTICS) (PUBLIC HEALTH)

KANEVSKIY, Ye.M., inzh. (g.Dneprodzershinsk)

Cars for the transportation of apatite concentrate. Zhel.dor.transp.
42 no.12:73 D '60. (MIRA 13:12)
(Apatite--Transportation) (Railroads--Cars)

KANEVSKIY, Yevgeniy Markovich; PERESLAVTSEV, Anatoliy Valentinovich;
YARTSEV, N., red.; PAVLOVA, S., tekhn. red.
[Landscaping a city yard] Blagoustroistvo gorodskogo dvora. Mo-
skva, Mosk. rabochii, 1961. 76 p.
(Moscow—Landscape gardening) (MIRA 14:8)

5 KANEVSKIY, E. N.

High-Speed Cutting : the Machining of Wasp's Gears.
I. M. Goltman and E. N. Kanevskii. (Stanki i Instrumenty,
1950, No. 3, 18-19). [In Russian]. A high-speed lathe
method is described which, carried out without cooling,
secures a quality of surface satisfactory for wheel revision.

FAKTOROVICH, M.D.; KANUVSKIY, Ye.N.

Universal ballast measuring hopper car. Biul.tekh.-ekon.inform.
no.11:75-76 ' 58. (MIRA 11:12)
(Railroads--Cars)

KANEVSKIY, Ye.N., inzh.(Dnepropetrovsk); GORBACHEVSKIY, I.I., inzh.(Minsk)

Using electric vibrators for unloading freight cars. Zhel.dor.

transp. 41 no.3:77 № '59.

(MIRA 12:6)

(Vibrators) (Railroads--Freight cars)

(Loading and unloading)

KANEVSKIY, Ye.N.; KHMEL'NITSKIY, G.I.

Automatic butt welding with use of a split electrode of longitudinal girder walls for railroad flat cars. Avtom. svar. 13 no.6:46-47 Je '60. (MIRA 13:7)

1. Dnepredzerzhinskiy vagonostroitel'nyy zavod imeni gazety "Pravda".
(Girders—Welding) (Railroads—Freight cars)

68897

S/051/60/008/02/025/036

E201/E391
Yu.P.

24.2600

AUTHORS:

Yefremov, Yu.P. and Kanevskiy, Yu.P.

TITLE:

On the Correction to the Dimensions of the Exit Diaphragm
in Photoelectric Recording of Equal-inclination Interference
Bands

PERIODICAL: Optika i spektroskopiya, 1960, Vol 8, Nr 2,
pp 266 - 268 (USSR)

ABSTRACT: All photoelectric devices used to record interference rings
of equal inclination have a diaphragm which separates out
the central portion of the patterns. Light passed by this
diaphragm reaches a photoelectric receiver connected to an
amplifier and an automatic recorder. When separations of
Fabry-Perot plates are not too small, a change in the
order of interference is produced most simply by a change
in the pressure of air between etalon mirrors (Refs 1-3).
The automatic recorder records a series of consecutive
interference orders. Maxima do not, however, occur at
integral values of the interference order N but at some-
what larger values $N + \delta$ (the interference bands seem
to be displaced towards higher orders). Chabbal (Ref 4)

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S/051/60/008/02/025/036

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On the Correction to the Dimensions of the Exit Diaphragm in
Photoelectric Recording of Equal-inclination Interference Bands

and Jaffe (Ref 5) found that for a circular diaphragm
 $\delta\epsilon = 0.5\Delta$, where $\Delta = td^2/4\lambda f^2$, t is the separation
of the etalon mirrors, d is the diaphragm diameter,
 λ is the wavelength and f is the focal length of the
objective. Rank et al (Refs 6, 7) showed that for a
narrow slit $\delta\epsilon = 0.325\Delta$. Rank et al found also that
for a square diaphragm $\delta\epsilon = 0.5\Delta_1$ where Δ_1 represents
the value for a circular aperture whose diameter is that
of a circle inscribed on a square. The present paper
reports results of calculation of $\delta\epsilon$ for rectangular
diaphragms (sides a and b). The results obtained
differ from those of Rank et al. For example, if
 $a = b$, i.e. for a square diaphragm $\delta\epsilon = 0.64\Delta_1 = 0.32\Delta$,
where Δ is defined as $\Delta = t\sqrt{a^2 + b^2}/4\lambda f^2$. The
authors determined also experimentally the values of
 $\delta\epsilon/\Delta$ for various values of a/b . The technique used
was described earlier (Refs 8,9). The yellow-green lines

Card2/3

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68897

S/051/60/008/02/025/036

E201/E391

On the Correction to the Dimensions of the Exit Diaphragm in
Photoelectric Recording of Equal-inclination Interference Bands

of Kr⁸⁶ at 5870 and 5649 Å were employed: the
Fabry-Perot etalons were of 47 and 100 mm length.
Experimental results are shown in a figure on p 268 in the
form of a dependence of $\delta\epsilon/\Delta$ on a/b . For a square
diaphragm the experimental value was $\delta\epsilon = 0.32\Delta$ in
good agreement with the calculated value. For rectangular
diaphragms with $a/b = 0.5$, $\delta\epsilon/\Delta = 0.22$. Extrapolation
of the graph to a narrow slit ($a/b \rightarrow 0$) yielded a
value $\delta\epsilon/\Delta = 0.16$. The latter two values lie within
the calculated interval $0.1\Delta < \delta\epsilon < 0.3\Delta$ for
 $a \leq 0.1b$. There are 1 figure and 9 references, 4 of
which are Soviet, 3 English and 2 French.

SUBMITTED: July 3, 1959

Card 3/3

ACCESSION NR: AT4025292

S/0000/63/000/000/0042/0048

AUTHOR: Gladushchak, V. I.; Kanevskiy, Yu. P.; Shreyder, Ye. Ya.

TITLE: New method of energy calibration of vacuum spectral instruments

SOURCE: Diagnostika plazmy* (Plasma diagnostics); sb. statey. Moscow, Gosatomizdat, 1963, 42-48

TOPIC TAGS: spectrometry, spectrometer calibration, spectral line intensity, monochromator, spectrographic analysis

ABSTRACT: The graduation method proposed is suitable for the graduation of monochromators as well as spectrographs. It is pointed out that prior calibration of the spectral instrument is more practical than the use of a standard comparison source, which in the vacuum region of the spectrum would have to be a synchrotron, which in turn entails noticeable experimental difficulties. The calibration is by recording on the vacuum spectral instrument the radiation from a source in which the ratio of the spectral-line intensity can be determined from measurements in the visible region of the spectrum and from the calculated transition probabilities. The theory of such a method is described briefly and its errors are analyzed. The method was used to calibrate a normal-incidence spectrograph (SP-99, grating with

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ACCESSION NR: AT4025292

2 meter radius and 1200 lines per mm, linear dispersion $4.14/\text{mm}$). The light source was a low-voltage vacuum spark. By recording the spectrum of the vacuum spectrograph on film and comparing the calculated intensity ratios with the experimental ones it was possible to determine a coefficient characterizing the transmission of the instrument and the quantum yield of the material employed. The tests were made against 12 lines of Al III. The Al III and SiIV lines were used for the calibration, and the transition probabilities for these lines was calculated from the tables of Bates and Dangaard (Phil. Trans. Roy. Soc. v. 242, 101, 1949). The radiation of the spark was simultaneously photographed on a quartz spectrograph (ISP-28) and on the calibrated instrument, and the intensities of the spectral lines were measured. The intensity ratios of the Al III lines were calculated. From the known transition probabilities and the temperature measured with the ISP-28. Several version of the measurement technique are also described. Orig. art. has: 3 formulas and 2 tables.

ASSOCIATION: None

SUBMITTED: 19Oct63

DATE ACQ: 16Apr64

ENCL: 02

SUB CODE: GP, OP

NR REF SOV: 004

OTHER: 005

Card 2/4

ACCESSION NR: AT4025292

ENCLOSURE: 01

A1 III

	1	2	3	4
5696	4S-4P _{3/2}	3,4	17,8	
4701	4F ₁ -5D ₁	0,80	23,4	
4529	4P _{3/2} -4D ₁	16	20,5	
4150	4D ₁ -5F ₁	29	23,5	
3713	4P _{3/2} -5S	4,4	21,1	
3601	3D ₁ -4P _{3/2}	5,8	17,8	
2961	4F ₁ -6D ₁	0,34	24,9	
2703	4D ₁ -6F ₁	16	25,0	
2213	4P _{3/2} -5D ₁	1,04	23,4	
1936	3D ₁ -4F ₁	170	20,8	
1855	3S-3P _{3/2}	21	6,6	
1612	3P _{3/2} -3D ₁	91	14,4	
1384	3P _{3/2} -4S	17	15,6	
1353	3D ₁ -5P ₁	61	23,5	
857	3P _{3/2} -5S	6,1	21,1	
698	3S-4P _{3/2}	2,0	17,8	
560	3S-5P ₁	3,4	22,0	

S1 IV

	1	2	3	4
4328	5P _{3/2} -6S	4,2	37,2	
4212	5D ₁ -6P ₁	23	30,0	
4116	4S-4P _{3/2}	3,1	27,0	
3762	4D ₁ -5P _{3/2}	9,2	34,2	
3166	4P _{3/2} -4D _{3/2}	32	31,0	
2287	4D ₁ -5F ₁	89	36,4	
2127	4P _{3/2} -5S	12	32,8	
1727	3D _{3/2} -4P _{3/2}	10,5	27,0	
1722	3D _{3/2} -4P _{3/2}	21	27,0	
1394	3S-3P _{3/2}	35	8,5	
1128	3P _{3/2} -3D _{3/2}	170	19,8	
1067	3D ₁ -4F ₁	540	31,4	
18	3P _{3/2} -4S	44	24,0	
455	3S-4P _{3/2}	13	27,0	

Transition probabilities of A1 III and S1 IV

Card 3/4

G. I. KANEVSKIY, V. I.; KANEVSKIY, Yu. P.; SHREYDER, Ye. Ya.

"Energy Measurements in the Vacuum Ultraviolet."

report submitted to 11th Intl Spectroscopy Colloq, Belgrade, 30 Sep-4 Oct 63.

DAVIDOVICH, N.V.; KANEVSKIY, Z.M.; CHIZHOV, O.P.; AVSYUK, G.A., otv. red.;
OGANOVSKIY, P.N., red.

[Materials on glaciological research; Novaya Zemlya; meteorology]
Materialy glatsiologicheskikh issledovaniy: Novaya Zemlya; Meteorologia. Moskva, No.1. [Principal meteorological observations] Osnovnye meteorologicheskie nabludeniya. 1961. 115 p. No.4. [Additional observations] Dopolnitel'nye nabludeniya. 1961. 119 p.
(MIRA 14:11)

1. Akademiya nauk SSSR. Institut geografii.
(Novaya Zemlya—Meteorology—Observations)

DAVIDOVICH, N.V.; KANEVSKIY, Z.M.; CHIZHOV, O.P.; AVSYUK, G.A., otv.
red.; OGANOVSKIY, P.N., red.

[Materials on glaciological research: Novaya Zemlya; meteorology]
Materialy gliatsiologicheskikh issledovaniy: Novaya Zemlya; me-
teorologiya. Moskva, No.2. [Principal meteorological observa-
tions] Osnovnye meteorologicheskie nabludeniya. 1961. 130 p.
(MIRA 15:3)

1. Akademiya nauk SSSR. Institut geografii.
(Novaya Zemlya--Meteorology--Observations)

KANEVSKIY, Zinovy Moiseyevich; FINKEL'SHTEYN, Moisey Ionovich;
TIKHONOV, V.I., retsentsent; GOLUBTSOV, M.G., red.;
BUL'DYAYEV, N.A., tekhn.red.

[Fluctuation noise and radio impulse signal detection]
Fluktuatsionnaya pomekha i obnaruzhenie impul'snykh ra-
diosignalov. Moskva, Gosenergoizdat, 1963. 215 p.

(MIRA 16:8)

(Radio--Interference)

(Pulse techniques (Electronics))

- - - - - 2001/2002 (b) Part ACP (A) = 5/2 mm (b) (c), per 1/2 mm

REF ID: A64044675

[illegible]

Generator of bell-shaped electrical pulses

3. Prihory i tehnika eksperimenta. n. i. 1977. 11. 19.

TOPIC TAGS: pulse generator, bell shaped pulse generator, variable duration

7- GENERAL: 3

The 1- and 100-microsec duration at a repetition rate of 0.1-1,000 cps is described. The pulse shaping is based on a utilization of the nonlinear characteristics of the diode. The pulse shaping is performed in two stages.

1. The first group of authors (e.g., [1, 2]) has shown that the use of a single factor model is not sufficient to explain the observed data. They have proposed a two-factor model, in which the first factor represents the common variance and the second factor represents the unique variance. This model has been found to be a good fit for the data.

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ACCESSION NR: AP4044675

... at the output. Some details of the electronic ... are applied. The

L 51288-63 ENT(a)/EEC(t)/FSS-2/EEC-4/EEC-2 Pn-4/Pp-4/Pac-4

ACCESSION NR: AP5009071

UR/0108/65/020/003/0003/0008

... Z. M. (Active ...)

informational feedback

... Radiotekhnika, v. 20, no. 3, 1967 ...

... for ...

... message ...

... at ...

NOT. The probability of distortion that still remains after many repetitions have

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L 51288-65

MISSION NR AP5009071

depends on the levels and nature of the noise in the forward and feedback channels, the probability can approach zero if the effect of the noise on the code zeros and units is asymmetrical; (3) The residual probability under fluctuating

and formulas

ASSOCIATION: Nauchno-tekhnicheskoye obshchestvo radiotekhniki i elektrosvyazi
Engineering Society of Radio Engineering and Electronics

EN

OTHER

2-2

L 21550-66 EWT(d)/F88-2/T/EWP(1) IJP(c)

ACC NR: AP6008292

SOURCE CODE: UR/0109/66/011/003/0536/0537

AUTHOR: Kanevskiy, Z. M.

ORQ: none

TITLE: One condition for efficient transmission with an "information feedback"

SOURCE: Radiotekhnika i elektronika, v. 11, no. 3, 1966, 536-537

TOPIC TAGS: error correction, data transmission, digital transmission

ABSTRACT: A data transmission system with automatic error correction of the automatic-request-for-repetition (ARQ) type is briefly considered. The transmission is improved so long as this inequality holds true: $P_1 < P_m(1 - P_{n1})$, where P_1 is the probability of message image (or mirror) mutilation; P_m is the probability of message mutilation in the forward channel; P_{n1} is the probability of nonimage mutilation. For binary-code transmissions, this formula is transformed into: $P_{10} + P_{01} < 1$, where P_{10} is the probability of loss of "one" (signal) and P_{01} is the probability of false signal in the reverse ("feedback") channel. When

Card 1/2

UDC: 621.391.17

43
B

2

L 21550-66

ACC NR: AP6008292

0

the latter formula is not satisfied, the transmission fidelity is lower than that without the ARQ channel. Orig. art. has: 1 figure and 3 formulas. [03]

SUB CODE: 17 / SUBM DATE: 09Nov64 / ORIG REF: 001 / ATD PRESS: 4219

Card 2/2 BLC

L 31123-66 EWA(h)/EWI(1)

ACC NR: AP6011459

SOURCE CODE: UR/0109/66/011/004/0761/0762

AUTHOR: Kanevskiy, Z. M.

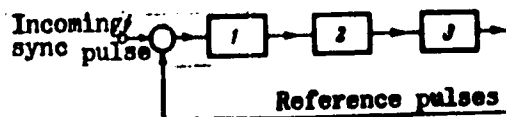
ORG: none

TITLE: "Synchrophase" LC-oscillator 25

SOURCE: Radiotekhnika i elektronika, v. 11, no. 4, 1966, 761-762

TOPIC TAGS: oscillator, LC oscillator

ABSTRACT: The phase of an oscillator synchronized by incoming (long-distance) sync pulses depends on the tuning of its oscillatory circuit and on the height and duration of the sync pulses. Reactance tubes combined with phase detectors have been used to offset the above undesirable effects; however, this results in rather complicated circuits. A simpler circuit (see Fig. 1) is suggested which comprises limiter 1, LC-oscillator 2, and reference-pulse shaper 3. The latter produces short slanted-front reference pulses which jointly with the short sync pulses are applied to the limiter. The latter is so adjusted that the sync pulses pass to the oscillator only after they have been superposed on the local reference pulses. Experimental results with a 8450-cps oscillator: reference and sync pulse duration,



Card 1/2

UDC: 621.373:421.11.072.9

L 31123-66

ACC NR: AP6011459

0.4--0.5 μ sec or less; lock-in band, 0.5--~~1%~~; phase error, \pm 2--5°. Orig. art. has:
3 figures. [03]

SUB CODE: 09 / SUBM DATE: 12Jul65/ ATD PRESS: 4239

Card 2/2 PC

L 09192-67

ACC NR: AP7002803

SOURCE CODE: UR/0106/66/000/009/0024/0027

AUTHOR: Kanevskiy, Z. M.

20
6

ORG: none

TITLE: Transmission of messages with feedback with variable upper number of repetitions

SOURCE: Elektrosvyaz', no. 9, 1966, 24-27

TOPIC TAGS: radio transmission, electronic feedback

ABSTRACT: An expression is concluded for the maximal permissible number of repetitions of one message for a transmission system with feedback, based on the permissible mean number of repetitions. The expediency of co-ordinated assignment of the maximal number of repetitions for production of minimum error under given conditions of message throughout over the communications channel is pointed out. Orig. art. has: 2 figures and 6 formulas. [JPRS: 39,183]

SUB CODE: 17 / SUBM DATE: 18Oct65 / ORIG REF: 002

Cord 1/1 ^hno

UDC: 621.394.5

0925 1691

ACC NR: AP6022013

SOURCE CODE: UR/0120/66/000/003/0143/0144

AUTHOR: Kanevskiy, Z. M.

ORG: Voronezh Polytechnic Institute (Voronezhskiy politekhnicheskiy institut)

TITLE: A generator of control pulses of the nonius type

SOURCE: Priory i tekhnika eksperimenta, no. 3, 1966, 143-144

TOPIC TAGS: pulse generator, control circuit, electric device

ABSTRACT: A control pulse generating circuit is presented which, when triggered by a single pulse, produces a series of N pulses arriving in sequence at N outputs of the device. In this circuit the control pulses are obtained by the combined use of two delay lines the total length of which, for the given interval between the pulses and their number N, can be appreciably smaller than that in a corresponding circuit with a single delay line. A positive pulse and a negative pulse, which may be obtained from a single triggering pulse, are applied, respectively, to the inputs of the two delay lines. Orig. art. has: 4 figures.

SUB CODE: 09/ SUBM DATE: 06Jun65

Card 1/1

UDC: 621.374

ACC NR: AP7001536

SOURCE CODE: UR/0108/66/021/012/0050/0057

AUTHOR: Kanevskiy, Z. M. (Active member of society); Tokarev, B. V. (Active member of society)

ORG: Scientific and Technical Society of Radio Engineering and Electro-communication im. A. S. Popov (Nauchno-tekhnicheskoye obshchestvo radiotekhniki i elektrosvyazi)

TITLE: Optimal threshold in receiving pulse-code messages in information-feedback systems

SOURCE: Radiotekhnika, v. 21, no. 12, 1966, 50-57

TOPIC TAGS: pulse code modulation, signal reception, communication system

ABSTRACT: An optimal threshold is sought which ensures minimum residual probability of distortion of PCM messages, in an information-feedback system, under fluctuation-and-impulse-noise conditions. The probability of signal loss caused by a normally-distributed fluctuation noise is examined; for this case, the

Card 1/2

UDC: 621.391.133

ACC NR: AP7001536

optimal threshold is $v = 2 \sqrt{2} h$, where $h = U / \sqrt{2} \sigma$; U - signal-pulse amplitude, σ - noise effective voltage; the formula is valid for $h \geq 2 \sqrt{2}$. The probability of false signal caused by an impulse random noise is also considered; it is proven that, in this case, such a threshold can be selected that the residual probability of message distortion would be zero. Orig. art. has: 3 figures and 40 formulas.

SUB CODE: 09, 17 / SUBM DATE: 02Mar65 / ORIG REF: 004 / OTH REF: 001

Card 2/2

ACC NR: AR6000116

SOURCE CODE: UR/0058/65/000/008/D038/D038

SOURCE: Ref. zh. Fizika, Abs. 8D318

AUTHORS: ^{44, 55}Gladushchak, V. I.; ^{44, 55}Shreyder, Ye. Ya.; ^{44, 55}Kanevskiy, Yu. P.

ORG: none

TITLE: Energy measurements in vacuum ultraviolet

CITED SOURCE: Tr. Komis. po spektroskopii. AN SSSR, M., t. 2, vyp. 1, 1964, 561-566

TOPIC TAGS: ^{21, 44, 55}UV spectrum, spectral line, line intensity, transition probability, spectrographic camera, aluminum, silicon

TRANSLATION: A method is proposed for calibrating spectral instruments for the performance of absolute and relative measurements of intensities in the vacuum region of the spectrum. The calibration is by means of a source in which the relative and absolute intensities of the spectral lines can be determined from measurements in the visible region of the spectrum and from the calculated transition probability. The source chosen for this purpose was a low-voltage vacuum spark between aluminum electrodes. The method is applicable for the calibration of vacuum spectrographs by means of the Al-III and Si-IV lines in the wavelength interval 450-2200 Å.

SUB CODE: 20

Card 1/1 *ndo*

BRNEV1007, V. P., (EN3P)

Dissertation: "Investigation of the Technological Possibilities of Tangential Turning on a Lathe." Cand Tech Sci, Moscow Automotive Mechanics Inst, 14 May 54.
Vechernyaya Moskva, Moscow, 5 May 54.

SO: SUM 284, 26 Nov 1954

REBEVISOV, VALENTI MIKHAYLOVICH

VARDIN, Grigoriy Dmitriyevich; KANEVTSOV, Valeriy Mikhaylovich, kandidat
tekhnicheskikh nauk; AKVAN, Gotsel' Kalmanovich; PASTUKHOV,
Nikolay Semenovich, inzhener

[Device for machining body parts on vertical turning lathe. New chuck
for gripping conical surfaces. Device for cutting elastic washers
on lathes. Work practices with multi-spindle automatic lathes]
Povorotnoe prispособlenie dlia obrabotki korpusnykh detalei na
karusel'nykh stankakh. Novyi patron dlia sashima konicheskikh
poverkhnostei. Prispособlenie dlia rubki pruzhiniaschchikh shait
na tokarnou stanke. Opyt raboty na mnogospindel'nykh tokarnykh
avtomatakh. Moskva, 1956. 13 p. (Peredovoi proizvodstvenno-
tekhnicheskii opyt. Ser.10, Tokarnye raboty. No.T-56-150/4)

(MLHA 10:9)

1. Moscow. Institut tekhniko-ekonomicheskoy informatsii
(Machine tools--Attachments)

Translation from: Referativnyy zhurnal. Mashinostroyeniye, 1959, Nr 23, p 89 (USSR)

SOV/123-59-23-96801

AUTHOR: Kanevtsov, V.M.

TITLE: Technological Cutting Conditions for Cutting-Off Tools

PERIODICAL: Tekhnol. podshipnikostroyeniya, 1958, Nr 17, pp 43 - 49

ABSTRACT: The following technological cutting (C) conditions for cutting-off tools were studied: one-sided successive C with two cutting-off tools, double-sided successive C and C with oscillating movements of the cutting-off tool. The author describes the designs of pilot devices for the generation of the oscillating movements, developed by the ENIIPP (Experimental Scientific Research Institute of the Bearing Industry) and states the investigation results of the given C method. It was found that cutting with oscillating movements and also successive C considerably improve the operating conditions of the cutting-off tool. The application of both these methods ensures a reliable operation, without jamming and breakdowns, of hard-alloy cutting-off tools of 2.5 - 3.5 mm thickness, and the introduction of high-speed tube C. The author recommends to use stamped cutting-off tools equipped with T14K8 grade hard alloy. For steel the C speed should be

Card 1/2

Technological Cutting Conditions for Cutting-Off Tools

SOV/123-59-23-96801

90 - 120 m/min with a feed of 0.06 - 0.10 mm/revolution. The following oscillation conditions should be employed: number of double motions 60 - 100 per minute, amplitude of oscillation = 0.2 - 0.4 mm. The application of hard-alloy cutting-off tools increases the operative efficiency of tube C by more than twice. Ten figures, 3 references.

B.I.L.

Card 2/2

S/121/60/000/010/008/015
A004/A001

AUTHOR: Kanevtsov, V. M.

TITLE: Improved Cutting-Off Tool Designs

PERIODICAL: Stanki i Instrument, 1960¹⁴, No. 10, pp. 24-25

TEXT: The author reports on a new cutting-off tool design developed by the Eksperimental'nyy institut podshipnikovoy promyshlennosti (Experimental Institute of the Bearing Industry). This new cutting-off tool differs in so far from the conventional designs that the lateral surfaces of its cutting part represent a surface section of a circular or elliptic cylinder whose axis is inclined towards the tool base. This is attained by grinding the lateral surfaces of cutting-off tools with a cup-shaped grinding disk on a universal tool grinding machine. In this case, the contact surface during the grinding amounts to a minimum which reduces the heat release connected generally with the origination of cracks on carbide tool bits. Besides, when the grinding is effected with a cup-shaped grinding disk, it is possible in proportion to its wear, to adjust the real curvature magnitude of the lateral surface by way of turning the disk axis relative to the direction of longitudinal feed during grinding. The lateral tool surface

w1
Card 1/2

Improved Cutting-Off Tool Designs

S/121/60/000/010/008/015
A004/A001

will be elliptic if the grinding disk is set at an angle of ψ . The parameters of the originating ellipse are: $a = R$; $b = R \cos \psi$. The curvature radius of the lateral surface at the tool peak can be expressed by a curvature radius corresponding to the peak of the small ellipse axis: $\rho = \frac{a^2}{b}$. By substituting in this equation the values of the semiaxes a and b of the ellipse, formed by the cup-shaped disk of the radius R and set at angle ψ , the approximated value of the curvature radius of the lateral surface is obtained: $\rho = \frac{R}{\cos \psi}$. The clearance angle α corresponds in the cutting plane to the auxiliary back angle α_1 , and in the feed plane to the auxiliary angle in the plane ψ_1 . The author recommends the following angle magnitudes for cutting-off tools with sintered carbide bits for the machining of steel with $\sigma_t = 60 \pm 70 \text{ kg/mm}^2$: $\psi = 40 - 50^\circ$; $\theta = 30 - 40^\circ$; $\alpha = 10^\circ$; $\gamma = 10 - 15^\circ$; $\alpha_1 = 4 - 5^\circ$; $\psi_1 = 4 - 5^\circ$. Cutting off tools (of high-speed steel with sintered carbide bits) with inclined cylindrical lateral surfaces have been introduced at the IGPZ and other bearing-producing plants. There are 3 figures.

Card 2/2

BAYKOV, S.P., kand. tekhn. nauk; BELENKO, I.S., kand. tekhn. nauk;
 BELKOV, S.F., inzh.; BELYANCHIKOV, M.P., inzh.; BERNSHTEYN,
 I.L., inzh.; BOGORODITSKIY, D.D., inzh.; BOLOHOVA, Ye.V.,
 kand. tekhn. nauk; BROZGOL', I.M., kand. tekhn. nauk;
 VLADIMIROV, V.B., inzh.; VOLKOV, P.D., kand. tekhn. nauk;
 GERASIMOVA, N.N., inzh.; ZHUKHOVITSKIY, A.F., inzh.;
 KABANOV, M.F., inzh.; KANEVTSOV, V.M., kand. tekhn. nauk;
 KOLOTENKOV, I.V., inzh.; KONDRAT'YEV, I.M., inzh.;
 KUZNETSOV, I.P., kand. tekhn. nauk; L'VOV, D.S., kand.
 tekhn. nauk; LYSENKO, I.Ya., kand. tekhn. nauk; MAKAROV,
 L.M., inzh.; CLEYNIK, N.D., inzh.; RABINER, Ye.G., inzh.;
 ROZHDESTVENSKIY, Yu.L., kand. tekhn. nauk; SAKHON'KO, I.M.,
 kand. tekhn. nauk; SIDOROV, P.N., inzh.; SPITSYN, N.A., prof.,
 doktor tekhn. nauk; SPRISHEVSKIY, A.I., kand. tekhn. nauk;
 CHIRIKOV, V.T., kand. tekhn. nauk; SHEYN, A.S., kand. tekhn.
 nauk; NIEERG, N.Ya., nauchnyy red.; BLAGOSKLONOVA, N.Yu., inzh.,
 red. izd-va; SOKOLOVA, T.F., tekhn. red.

[Antifriction bearings; manual] Podshipniki kachenia; spra-
 vochnoe posobie. Moskva, Gos. nauchno-tekhn. izd-vo mashino-
 stroit. lit-ry, 1961. 828 p. (MIRA 15:2)
 (Bearings (Machinery))

S/276/63/000/001/011/028
A006/A101

AUTHOR: Kanevtsov, V. M.

TITLE: Carbide cutting-off tools

PERIODICAL: Referativnyy zhurnal Tekhnologiya mashinostroyeniya, no. 1, 1963, 85 - 86, abstract 1B513 ("Tr. Vses. n.-i. konstrukt. tekhnol in-ta podshipnik, prom-sti", 1960, no. 2 (22), 29 - 46)

TEXT: Information is given on investigations to improve the geometry of carbide cutting-off tools; the techniques of their manufacture, and the cutting properties of carbides of various grades, including TT7, K12 and T5 K12 B (T5K12V), for machining IX 15 (ShKh15) steels. Cylindrical lateral cutting-off tool surfaces with the axis inclined to the cutter basis, are found to be the most efficient shapes. The magnitudes of the auxiliary rear angle φ and the angle in the plane α_1 , may approach optimum values without impairing the durability of the cutter. It is recommended to produce the cutting-tool holder of type 45 or Y7 (U7) carbon steels; during soldering the carbide plates pressed to the cutter should be heated by hf-current for 10 - 15 sec. It is also suggested to quench-harden the holder tip to increase its durability and reduce internal stresses

Card 1/3

S/276/63/000/001/011/028
A006/A101

Carbide cutting-off tools

in the plate, by utilizing the heat preserved in the tip after soldering the plate. The lateral surfaces of the cutter are ground by the periphery of a cup wheel whose axis is parallel or inclined to the direction of the longitudinal feed in grinding and is displaced from the cutter point by a magnitude depending on the geometrical parameters of the tool. The front and rear surfaces of the tool are finished with a cast-iron disk, charged with boron carbide. For machining ShKh15 steel the following values are recommended: $\alpha = 8^\circ$, $\gamma = 12 - 15^\circ$, $b = 0.1 - 0.3$ mm through an angle from 0 to -5° ; $\varphi = 3 - 5^\circ$, $\varphi = 3^\circ$, $\lambda = 0$. Grade TT7, K12 and T5 K12V high-strength carbides can be used in multispot pipe cutting on pipe-cutting automatic machines and turret lathes and also for machining rings on multi-spindle automatic lathes with "frezol" cooling. More wear resistant grades such as T14K8, T5K10 can be used for machining rings of pipes on automatic machines with a cooling emulsion. To cut thick-walled pipes it is recommended to employ cutting with oscillating feed or two-sided cutting with large and narrow tools. Machining of ShKh15 steel with tools having TT, 7K12 and T5K12V plates ($T = 90$ min) is performed at $V = 47 - 53$ m/min and $s = 0.12 - 0.1$ mm/rev. For T5L10 carbide $V = 80 - 90$ m/min, for T14K8 carbide $V = 90 - 110$ m/min $s = 0.07 - 0.09$ mm/rev; the index of relative durability for TT7K12 carbide is 1/5, and 1/4 for T5K12V carbide. The replacement of high-speed cutting tools by cutters with

Card 2/3

Carbide cutting-off tools

S/276/63/000/001/011/028
A006/A101

T17K12 and T5K12V carbide plates for machining ShKh15 steel will raise ν by a factor of 2; if cutters with T14K8 and T5K10 are used ν increases by a factor of 3 - 4. There are 18 figures, 6 tables and 10 references.

E. Dymova

[Abstracter's note: Complete translation]

Card 3/3

VOLOSOV, S.S.: KANEVTSEV. V.M., kand. tekhn. nauk, retsenzen

[Technological and metrological fundamentals for precision
in regulating dimensions in the manufacture of machinery]
Tekhnologicheskie i metrologicheskie osnovy tochnosti regu-
lirovaniia razmerov v mashinostroenii. Moskva, Izd-vo "Ma-
shinostroenie," 1964. 278 p. (MIRA 17:6)

tion at the moment when a polarizing current passing through the earth is switched

T REPORT AC

Exploratory Geophysics)

Card 2/2

KANEYEV, I. V.

Kaneyev, I. V.

"Mechanical Extrusion of Cylindrical Parts of Sheet Metal (The Problems of Mechanization of Lathe-Extrusion Processes)." Min Higher Education USSR. Kazan' Aviation Inst. Kazan', 1955. (Dissertation for the Degree of Candidate in Technical Sciences.)

SO: Knizhnaya Letopis', No. 27, 2 July 1955

Kaneyev, I. V.

AUTHOR: Kaneyev, I.V., Candidate of Technical Sciences.

TITLE: The mechanization of lathe spinning work. (Mekhanizatsiya tokarno - davi'l'nykh rabot) 122-2-12/23

PERIODICAL: "Vestnik Mashinostroyeniya" (Engineering Journal), 1957, No.2, pp. 58 - 60 (U.S.S.R.)

ABSTRACT: The spinning of a cylindrical cup in a fully mechanized set-up was carried out experimentally on aluminium and aluminium-magnesium alloy blanks of 2 mm thickness and over. Set-ups for the first and subsequent passes on an ordinary engine lathe are shown. Several spinning rollers were used with different radii. Each radius, together with the material thickness gives a range of flange widths for the first pass. The rate of tool feed and the spinning speed are plotted against the flange width. Experimentally determined reduction factors for the first and subsequent passes are tabulated. A large radius of the spinning roller together with an auxiliary filleted clamping roller are recommended. Edge trimming rollers are shown. The design of spinning roller mountings is illustrated in detail.

Card 1/1 There are 6 figures, including 2 graphs and 2 tables.

AVAILABLE: Library of Congress

25(1,7)

SOV/117-59-3-16/37

AUTHOR: Kaneyev, I.V., Candidate of Technical Sciences

TITLE: Mechanical Extrusion With Thinning (Mekhanicheskoye vydavlivaniye izdeliy s utoneniyem)

PERIODICAL: Mashinostroitel', 1959, Nr 3, pp 24 - 26 (USSR)

ABSTRACT: Information is given on a method of extrusion of hollow parts of various shapes (conical, spherical or cylindrical) from sheet metal blanks on lathes with the use of rounded-up press rollers and tracers. The method is developed and experimentally studied by the author. Experiments were carried out with commercial aluminum, duralumin, and aluminum-manganese alloy and several grades of steel. The process does not change the diameter or the width of blanks, i.e. only the thickness of the blank changes.

Card 1/2

Mechanical Extrusion With Thinning

SOV/117-59-3-16/37

The information includes detailed lathe setting data with illustrations, and formulas for calculating the resulting wall thickness of work. There are 4 sets of diagrams, 1 photo and 1 table.

Card 2/2

SHCHERBAKOV, K.F., kand.tekhn.nauk; KANEYEV, I.V.

Attachment to the PRVN-2,5 vineyard plow for turning the soil
and cultivating between rows. Trakt. i sel'khoz mash. 31 no.10:39-
40 0 '61. (MIRA 14:12)

1. Rostovskiy institut sel'skokhozyaystvennogo mashinostroyeniya.
(Plows--Attachments)
(Viticulture--Equipment and supplies)

L 19569-63 EWP(q)/EWT(m)/EWP(B)/BDS: AFTTC/ASD JD
ACCESSION NR: AP3007530 S/0181/63/005/009/2731/2733

AUTHOR: Niyazova, O. R.; Kanayev, M. A.

TITLE: Radiation defects in crystals of cadmium sulfide 27 27 AB

SOURCE: Fizika tverdogo tela, v. 5, no. 9, 1963, 2731-2733

TOPIC TAGS: radiation defect, radiation effect, surface defect, x ray bombardment, irradiation, irradiated cadmium sulfide, Gamma irradiation, irradiated material

ABSTRACT: An attempt is made to explain the process of formation of radiation defects on the surface of CdS crystals irradiated with x-rays and γ -rays. The defects, discovered by one of the authors (O. R. Niyazova. Avtoref. kand. diss., Tashkent, 1960), appear as dark point spots. In the case of γ -irradiation dark bands sometimes appear with the point defects. Both types of defects increase in size with increasing radiation doses, and the point defects sometimes change into many-pointed stars. It was determined that the defects consist of an amorphous substance and that they can be removed mechanically. The location and the density of the defects were found

Card 1/2

L 19569-63

ACCESSION NR: AP3007530

to coincide with those of etching pits. The authors conclude that these types of defects in CdS crystals are caused by the formation of products of radiation decay which diffuse to the crystal surfaces. Orig. art. has: 6 figures.

ASSOCIATION: Institut yadernoy fiziki AN UzSSR, Tashkent (Institute of Nuclear Physics, AN UzSSR)

SUBMITTED: 18Mar63

DATE ACQ: 14Oct63

ENCL: 00

SUB CODE: PH

NO REF SOV: 002

OTHER: 001

Card 2/2

KANFEL', O.M.; MAZAROVICH, O.A.; TURSINA, V.V.

Geology of the northern margin of the Karaganda Basin. Report -
No.1: Stratigraphy of Pre-Paleozoic and Paleozoic sediments.
Vest.Mosk.un.Ser.4: Geol. 17 no.6:19-35 N-D '62. (MIRA 16:1)

1. Kafedra istoricheskoy i regional'noy geologii Moskovskogo
gosudarstvennogo universiteta.
(Karaganda Basin--Geology, Stratigraphic)

KANFER, D.F., inzh.; CHERNOV, G.I., inzh.; TOPOL', N.F., inzh.;
ALFEROV, K.S., inzh.; YEVDOKIMOV, N.A., inzh.

Research at the Makeyevka Metallurgical Plant. Stal' 23
no.2:116,130-131,156 F '63. (MIRA 16:2)
(Makeyevka—Metallurgical research)

KANFER, V.D.; ROSTEMBERSKIY, A.V.

Improving the quality of sinter. Met. i gornorud. prom. no.5:3-5
S-O '64. (MIRA 18:7)

1. Donetskii nauchno-issledovatel'skiy institut chernoy metallurgii.

KANFER, V.D.; SHKLYAR, M.S.

Lever-type dust collectors for gas purification. Metallurg 6
no.3:12-13 Mr '61. (MIRA 14:5)

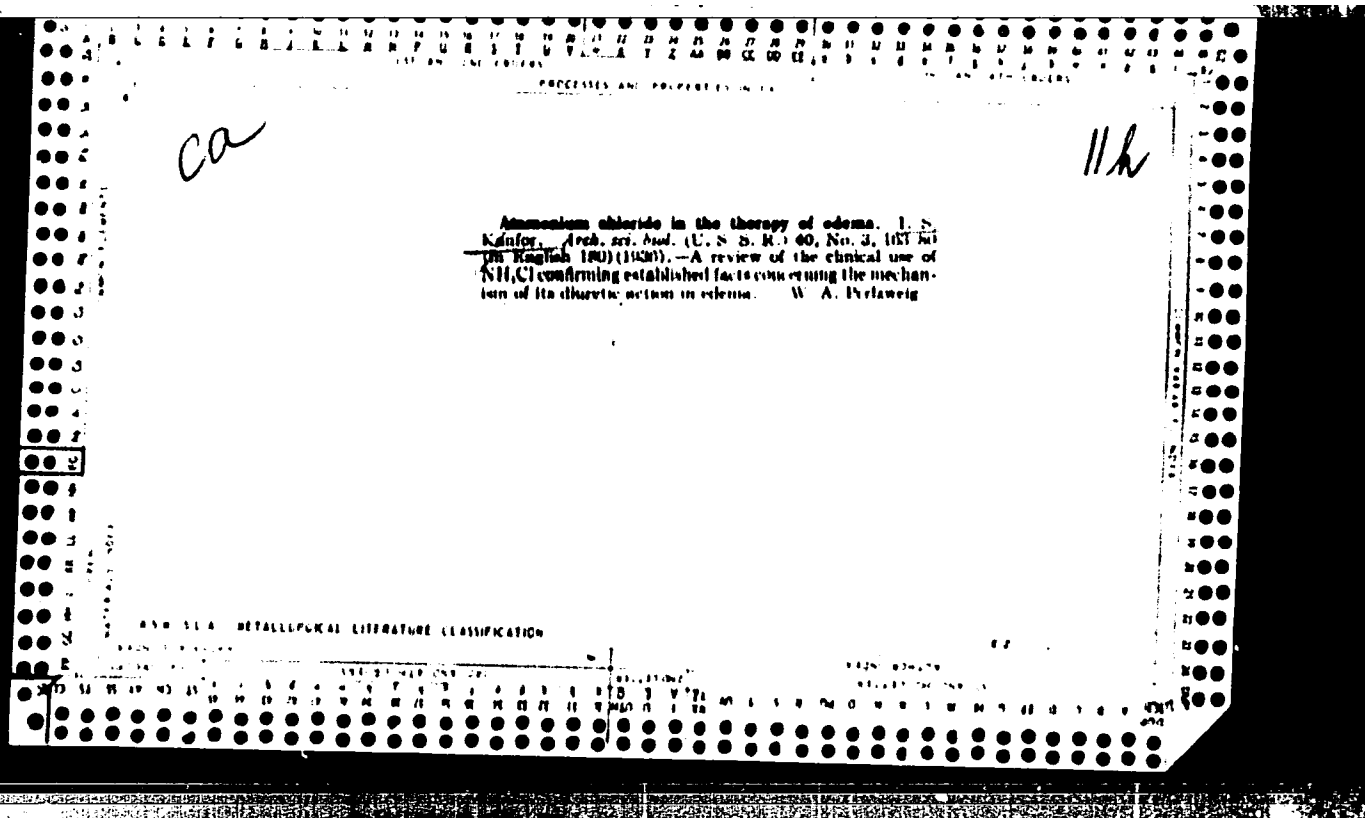
1. Makeyevskiy metallurgicheskiy zavod.
(Dust collectors)
(Gases—Purification)

ROSTEMBERSKIY, A.V.; XANFER, V.D.; SOLDATKIN, A.I., kand.tekhn.nauk;
KUMANI, B.G.; CHERNOV, G.I.; LOZNEVOY, V.S.; ZAPOROZHETS, N.P.

Increasing the productivity of sintering plants and improving
the quality of the sinter. Met. i gornorud. prom. no. 2:20-22
Mr-Apr '64. (MIRA 17:9)

MANFER, V.D.; KRIVASHYEV, V.N.; YEFANOVA, N.I.; KHLADEN, N. N.S.

Quality of lime and the kilning cycle in a kiln with fluidized
bed. Stroi. mat. 10 no.7:29-31 71 '64 (MORA 1861)



11F

CR

PROCESSING AND PROPERTIES INDEX

The influence of pancreatic lysozyme upon the blood sugar.
 I. S. Kander and V. V. Tatarukii. *Arch. sci. biol.* (U.S.S.R.) 61, No. 3, 18-20 (in English 181) (1936).--Lysozyme of cattle pancreas was prepd. by the method of Tashiro, consisting of digestion at 38° with pepsin at pH 2 in HCl-NaCl soln. until the disappearance of coagulable protein, partial neutralization with Na₂CO₃ to pH 3-4, heating at 70° for 15 min., addn. of 0.25% PbOH and filtration through a Berkefeld filter. These were tested by intra-peritoneal and subcutaneous injections into groups of 20 white mice weighing 16-20 g., which fasted for 1 hr. before injection. The sugar curves were detd. in the blood (obtained by decapitation) by the Hagedorn-Jensen method. The lysozyme contained no insulin; 0.5 cc. of a 1:10,000 diln. lowered the blood sugar to 40 mg. %. This mouse method is recommended for standardization of pancreas lysozymes. New possible aspects of diabetic therapy are discussed. W. A. Foriswold

ASB-SLA METALLURGICAL LITERATURE CLASSIFICATION

SOURCE SYMBOLS										SERIES MAP ONLY ONE										COLLATIONS										SERIES ONE ONLY ONE									
SOURCE SYMBOLS										SERIES MAP ONLY ONE										COLLATIONS										SERIES ONE ONLY ONE									
U	S	L	M	A	V	K	O	A	I	S	L	M	A	V	K	O	A	I	U	S	L	M	A	V	K	O	A	I	U	S	L	M	A	V	K	O	A	I	

KANFOR, I.S.; OL'NYANSKAYA, R.P.

Effect of stimulation of oral receptors on metabolism. Opyt izuch.
reg.fiziol.funk. no.3:44-52 '54. (MLRA 8:12)

1. Laboratoriya fiziologii gasoobmena i teploobmena Otdela obshchey
fiziologii Instituta eksperimental'noy meditsiny Akademii meditsin-
skikh nauk SSSR.

(METABOLISM) (MASTICATION) (BLOOD SUGAR)

USSR/Medicine - Neurophysiology

FD-2800

Card 1/1 17, 2/19

Author : Kanfor, I. S.

Title : Complex reflex regulation of the carbohydrate metabolism

Periodical : Byul. eksp. biol. i med. 6, 7-10, June 1955

Abstract : Article deals with the problem of the nerve mechanisms regulating carbohydrate metabolism studied by the method of simulated feeding of glucose to animals. The dogs used in the experiments had undergone gastrotomy or esophagotomy and were studied for the effects of actual and simulated glucose feeding. Results showed that the conditioned reflex hyperglycemia produced in the experiments was very stable and faded only slowly. Author concludes that regulation of the carbohydrate metabolism takes place by way of reflexes originating with stimulation of the reflectors in the mouth and ending with impulses regulating the processing of sugar in the organism. 10 references, 10 USSR, 3 since 1940, graphs, table

Institution : Laboratory of the Physiology of Gas Metabolism and Heat Metabolism (Head Prof R. P. Ol'nyanskaya) Division of General Physiology (Scientific Leader Academician K. M. Bykov) Institute of Experimental Medicine, Academy Medical Sciences, Leningrad

Submitted : 20 Aug 1954

KANFOR, I.S.

Method and appliance (cannula) for temporary exclusion of circulation from internal organs in acute and chronic experiments. Biol. eksp. biol. i med. 40 no.9:78-79 8 '55. (MLBA 8:12)

1. Iz laboratorii fiziologii gasoobmena i teploobmena (sav. R.P. Ol'myanskaya) otdela obshchey fiziologii (sav.-prof. A.V. Rikhl') Instituta eksperimental'noy meditsiny ANM SSSR, Leningrad.

(CARDIOVASCULAR SYSTEM, physiology,

method & appar. for exclusion of circ. from internal organs in acute & chronic exper.)

KANFOR I.S.
EXCERPTA MEDICA Sec 3 Vol 12/11 Endocrinology Nov 58

2100. COMPLEX MECHANISM OF REFLEX REGULATION OF THE BLOOD SUGAR LEVEL FOLLOWING THE INTAKE OF FOOD IN ENDOCRINE DISORDERS OF THE PANCREAS (Russian text) - Kanfor I. S. All-Union Inst. of Exp. Med., USSR Acad. of Med. Scis, Leningrad - PROBL. EN-DOKR. 1957, 32 (12-16) illus. 3

Observations were made on patients suffering from mild or latent forms of diabetes. An average of 17.6% rise in blood sugar lasting for 3 hr. was found to have been caused by slow sucking (up to 1 hr.) of 15 g. saccharine chocolate. In the same group of patients rapid consumption of chocolate caused the amount of sugar in blood to rise slightly (by 7.4%) and then to fall after 2 hr., so that at the end of the investigation, it had fallen below the initial level. In a second group of patients with more severe diabetes slow consumption of chocolate led to a gradual reduction (an average of 5.2%) of the blood sugar level. It was demonstrated that in these patients the rapid consumption of chocolate again caused some rise in the blood sugar for the first few hours followed later by a reduction below the initial level (fall of 3.4%). The author considers that, on eating, patients with a marked or untreated diabetes show some disturbance of the complex mechanism of reflex stimulation - a mechanism which involves excitation of the oral receptors and causes an increase of the blood sugar level.
Lekishvili - Leningrad (S)

KANFOR, I.S.
KANFOR, I.S.

Role of the pancreas in complex reflex regulation of carbohydrate metabolism [with summary in English] Biul. eksp. biol. i med. 43 no.2:22-26 P '57 (MIRA 10:5)

1. Iz laboratorii fiziologii gosooobmena i teploobmena (zaveduyushchiy-professor R.P. Ol'nyanskaya) otdela obshchey fiziologii (zaveduyushchiy-professor A.V. (Rikkl') Instituta eksperimental'noy meditsiny AMN SSSR, Leningrad. Predstavlena akademikom K.M. Bykovym.
(PANCREAS, physiology,
eff. of temporary exclusion on blood sugar in cats) (Rus)
(BLOOD SUGAR,
eff. of temporary exclusion of pancreas in cats) (Rus)

EXCERPTA MEDICA Sec 2 Vol 12/4 Physiology Apr 59

1269. CHARACTERISTICS OF THE COMPLEX REFLEX REGULATION OF BLOOD SUGAR IN MAN (Russian text) - Kanfor I. S. Inst. of Exp. Med. * USSR Acad. of Med. Scis, Leningrad - BYULL. EKSPER. BIOL. I MED. 1958, 46/8 (6-10) Graphs 2

Sham feeding of glucose solution and saccharin to patients after oesophagotomy causes prolonged (for 3 hr.) rise of blood sugar almost equal in intensity. Administration of glucose solution through the oesophagostomy directly into the stomach causes an increase in the blood sugar for 1.5 hr. with a subsequent fall (by 21.4%) below the initial level. Administration of saccharin solution into the stomach and through the oesophagostomy causes no rise in the blood sugar level whatsoever. The results emphasize the significance of the act of eating as the leading link in the control of blood sugar in man. Thus it was shown that the control of blood sugar is effected in a complex reflex way, including both unconditioned and conditioned natural food reflexes.

* Lab. Physiol of Gas exchange & Heat Exchange,
Dept of Gen. Physiol.

KANFOR, I. S. Doc Med Sci -- (diss) "On ^{complex} ~~combined~~-reflex regulation of ~~the~~
carbohydrate metabolism." Mos, 1959. 25 pp (Acad Med Sci USSR. Inst of
Experimental Med AMN USSR), 250 copies, List of author's works at end of
text (11 titles) (KL, 47-59, 116)

-38-

KANFOR, I.S.; VORONKOVA, A.A.

Complex reflex regulation of the blood sugar level in newborn infants.
Pediatrics 37 no.10:15-18 0 '99. (MIRA 13:2)

1. In laboratorii fiziologii gazoobmena i teploobmena (zaveduyushchiy -
prof. R.P. Ol'nyanskaya) otdela obshchey fiziologii (zaveduyushchiy -
akademik K.M. Bykov [deceased]) Instituta eksperimental'noy meditsiny
AMN SSSR i akushersko-ginekologicheskoy kliniki (zaveduyushchiy - prof.
K.M. Rabinovich) I Leningradskogo meditsinskogo instituta imeni I.P.
Pavlova.

(INFANT NEWBORN physiol.)
(BLOOD SUGAR physiol.)

KANFOR, I.S.; RUBEL', L.N.

Complex reflex effect of the act of eating on the lactic acid content of the blood. *Fiziol.shur.* 45 no.4:471-475 Ap '59.
(MIRA 12:6)

1. From the laboratory of respiratory and heat exchange, department of general physiology, Institute of Experimental Medicine, Leningrad.

(FOOD,

eating, eff. on blood lactic acid (Rus))
(LACTIC ACID, in blood,
eff. of eating (Rus))

KANFOR, I.S.

Method for the bloodless determination of systolic arterial pressure and of vascular dilatation and contraction levels in white rats.
Biol. eksp. biol. med. 47 no.1:118-121 Ja '59. (MIRA 12:3)

1. Iz laboratorii krovoobrashcheniya i dykhaniya (zav. - doktor biol. nauk N.I. Arinichin) otдела obshey fiziologii (zav. - prof. A.V. Rikkl' Instituta eksperimental'noy meditsiny ANU SSSR, Leningrad. Predstavlena akademikom K.M. Rykovym.

(BLOOD PRESSURE, determ.

bloodless determ. of systolic pressure & vasodilatation & vasoconstriction in rats (Rus))

(BLOOD VESSELS,

vasodilatation & vasoconstriction, determ. in rats (Rus))

KANTOR, I.S.

Effect of the stimulation of oral mechanico and chemoreceptors on carbohydrate metabolism. Biul. eksp. biol. i med. 47 no.4:24-27
Ap '59.

(WIRA 12:7)

1. Iz laboratorii fiziologii gasoobmena i teploobmena (zav. - prof. R. P. Ol'nyenskaya) Otdela obshchey fiziologii (zav. - prof. A. V. Rikkl') Instituta eksperimental'noy meditsiny AMN SSSR, Leningrad. Predstavlena deystvitel'nym chlenom AMN SSSR V. N. Chernigovskim.

(BLOOD SUGAR, physiol.

eff. of oral mechano- & chemoreceptor stimulation (Rus))

(MOUTH, physiol.

eff. of mechanical & chem. stimulation on blood sugar (Rus))

KANFOR, I.S.

Nature of the interrelationships between blood pressure, tone of the
blood vessels, and body temperature in white rats during radiation
injury. Med. rad. 5 no.12:71-72 '60. (MIRA 14:3)
(RADIATION SICKNESS) (BLOOD PRESSURE)
(BLOOD VESSELS) (BODY TEMPERATURE)

27.1220

39463

S/241/62/007/001/005/006
1015/1215

AUTHOR: Kanfor, I. S.

TITLE Arterial blood pressure in rats after whole body irradiation

PERIODICAL: Meditsinskaya radiologiya, v. 7, no. 1, 1962, 70-72

TEXT: Albino rats (247) were subjected to a single whole body X-irradiation of 600, 800, and 1,000 r. 84 rats survived one month after irradiation. A decrease in the systolic pressure was observed soon after irradiation. The hypotensive reaction was directly dependent on the irradiation dose. Death of the animals occurred some days after the arterial pressure decreased below 40 mm Hg. The author favors the concept of G. F. Lang, that arterial blood pressure is an indicator of the general biological tonus of the organism, rather than of the state of the circulatory system alone. The study of the number of leukocytes in peripheral blood did not reveal essential differences between rats which died of radiation sickness and those which survived. Leukopenia was found to be only transient, even after a dose of 1000 r. The ability to maintain systolic pressure above 50-60 mm Hg, and the increase in the leukocyte count after its initial decrease, both indicate favorable progress of the radiation sickness.

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Card 1/1

KANFOR, I.S.

Role of distance signal stimuli in the regulation of carbohydrate metabolism in monkeys. Biul. eksp. biol. i med. 52 no.10:8-13
O '61; (MIRA 15:1)

1. Iz laboratorii fiziologii gazoobmena i teploobmena (zav. - prof. R.P.Ol'nyanskaya) otdela obshchey fiziologii (zav. - akademik K.M. Bykov [deceased]) Instituta eksperimental'noy meditsiny (dir. - oplen-korrespondent AMN SSSR prof. D.A.Biryukov) AMN SSSR, Leningrad. Predstavlena akademikom V.N.Chernigovskim.
(CARBOHYDRATE METABOLISM) (CONDITIONED RESPONSE)

KANFOR, I.S.

Dynamics of arterial pressure after total-body irradiation of rats.
Med.rad. no.1: 0-72 '62. (MIRA 15:1)
(RADIATION--PHYSIOLOGICAL EFFECT) (BLOOD PRESSURE)

KANFOR, I.S.

Changes in the blood sugar level and body temperature in bats
at rest and in flight. Opyt izuch. reg. fiziol. funk. 6:31-35
'63 (MIRA 17:3)

1. Laboratoriya fiziologii gazookmena (zav. - prof. A.D.
Slonim), otdel obshchey fiziologii (zav. - prof. K.M. Bykov)
Instituta eksperimental'noy meditsiny AMN SSSR.

KANFOR, S.I., inzh.

Keramsit-concrete made of local raw materials. Sbor. trud. IUZHNII
no.2:92-98 '59. (MIRA 13:9)

1. Yushnyy nauchno-issledovatel'skiy institut po stroitel'stvu.
(Lightweight concrete)

COMMON ELEMENTS		PROCESSES AND PROPERTIES INDEX	
<p>KANFOR, S.S.</p> <p>9</p>		<p>Nitridation of steel, S. S. Kanfor, Russ. 20,445, Map 81, 1934. The steel in the austenitic state is heated to above the Ar₃ point, cooled and nitrated at a temp within the hysteresis range of Ar₃ Ar₁.</p>	
<p>ASD-SLA METALLURGICAL LITERATURE CLASSIFICATION</p>		<p>1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 51 52 53 54 55 56 57 58 59 60 61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95 96 97 98 99 100</p>	

KANFOR, S.S.

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Carbide formation during carburization. S. S. Kanfor.
Metallurg. 10, No. 10, 57-64(1935). Alloy steels containing
Cr, Ni, W, Mo or V were carburized at 930 1000°. The
carburized layer contained up to 5.42% C. The C content
can exceed the solubility limit of C in γ -Fe when elements, such
as Cr or W, which form stable carbides are present.
W. Wehmann

ASAC 3.4 METALLURGICAL LITERATURE CLASSIFICATION

